Part I
Farm Income and Farm Financial Balance Sheet

Net Value Added and Net Farm Income Attain New Highs in 1996

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Net value added and **net farm income** reached record levels in 1996, rising substantially from 1995 (table 1-1, table 1-2, and fig. 1-1). **Net value added** for 1996 was $19.1 billion more than in 1995, up 25 percent, and $9.5 billion greater than its previous high in 1994. Because net value added represents the total value of the farm sector's output of goods and services, less payments to other (nonfarm) sectors of the economy, it reflects production agriculture's addition to national output.[1] It also represents the sum of the economic returns to all the providers of factors of agricultural production: farm employees, lenders, landlords, and farm operators (fig. 1-2).

The $22.6-billion rise in final agricultural sector output far exceeded the $3.4 billion in out-of-pocket costs represented by intermediate consumption outlays, resulting in $19.1 billion more to be distributed among the providers of resources to the farm sector. As a consequence, hired workers received 6.1 percent more than in 1995 and lenders received an increase of 3.9 percent for their contributions to 1996 farm production. The earnings of nonoperator landlords were up 19.3 percent, reflecting several factors. Holders of share-rent contracts benefited from the additional $17 billion in crop production. Indications are that the implementation of the Federal Agriculture Improvement and Reform Act of 1996 has resulted in two significant trends in rental arrangements. First, landlords are renegotiating contract terms and raising rents to reflect the value of the government's payments and the certainty of the multiyear schedule of payments. Second, landlords are substituting cash leases for crop-share leases, obtaining higher rents and lessening the risk sharing.

Net farm income, which jumped $15.4 billion from 1995 to 1996, is that portion of net value added earned by farm operators (defined as those individuals and entities who share in the risks of production). In fact, the major share of the 1996 increment to net value added accrued to farm operators. Typically, it is the farm operators who benefit most from the increases and absorb most of the declines arising from short-term, unanticipated weather and market conditions. However, due to the rise in earnings of farm employ-

[1]ERS value-added estimates are used by the Bureau of Economic Analysis, U.S. Department of Commerce, for the National Income and Product Accounts (see p. 32, *Agricultural Income and Finance*, AIS-58, September 1995) and by the Organization for Economic Cooperation and Development in its international agricultural accounts.

About the Value-Added Format

The *value added format* is now used to present the agricultural sector income accounts for the United States, replacing the traditional net farm income format. The underlying accounting concepts remain the same under the new format and **the value for net farm income is identical**.

The presence of more disaggregated components under the value added format makes it much easier to discern what forces are driving the changes and trends in farm income. Changes in commodity production are the cause of most of the volatility in the income accounts, and much more detail is available to the reader in the value added format. For example, the critical impact of the value of feed grain production on the gyrations in net farm income is clearly observable in the value added format but not the previous presentation format. Likewise, the additional contributions in 1996 of soybeans, poultry, and dairy are clearly evident.

Perhaps most importantly, the value added approach to sector accounting has the advantage of being the format accepted and used internationally, thereby enabling comparisons across countries. Cross-country comparisons became more important with the sweeping changes in Federal agricultural commodity programs enacted under the Federal Agriculture Improvement and Reform Farm Act is the elimination of government controls on production as a requirement for Federal support payments to farmers. Producer planting decisions will now be based on incentives from the marketplace, which is truly global in scope.

For those who may wish to verify or otherwise have a better understanding of the relationship between the new and old presentation formats, two tables providing a map of how to do a crosswalk between the two formats are available in the national farm income section of the ERS Website (www.econ.ag.gov) or by requesting a copy from the Farm Income Accounts Team Leader (E-mail: rogers@econ.ag.gov)

ees, lenders, and landlords, net farm income rose less in 1996 than the increase in overall net value added (table 1-1, fig. 1-2).

Net cash income rose $8.8 billion, or 17.1 percent, from 1995 to 1996 (table 1-2). Net cash income reflects the cash earnings generated by the farm business that are available for debt servicing, capital purchases, and distribution to farm households to cover family living expenses. Net cash income, unlike net farm income, does not include the value of home consumption, changes in inventories, capital replacement, and implicit rent and expenses related to the farm operator's dwelling, which do not reflect cash transactions during the current year. Consequently, net cash income is more appropriate as an indicator of solvency than a measure of the value of the sector's output, which is viewed more accurately using either net value added (for the sector) or net farm income (for operators). Net cash income exhibits less volatility than net farm income, as producers try to manage their cash flow to meet multiple objectives: paying debt and family expenses, smoothing year-to-year income fluctuations to minimize income tax liabilities, and maximizing income by postponing sales in anticipation of higher prices or accelerating sales in anticipation of lower prices.

Agricultural Sector Output 11 Percent Higher in 1996

Final agricultural sector output, the value of the agricultural sector's output of commodities and services before expenses, rose $22.6 billion in 1996 to $226.2 billion (table 1-1). Higher output, reduced by an increase in intermediate consumption outlays of $3.4 billion, accounts for most of the $19.1-billion jump in **net value added**. The value of final 1996 crop output soared $17 billion, reflecting rebounds in acreage and yields for major crops, both of which had declined in 1995 following 1994's record harvest (fig. 1-3). Crop prices were much higher in the first half of 1996 relative to the same period in the prior year and tended to remain stable in the latter half of the year, despite the rebound in production (figs. 1-7, 1-8, 1-9, 1-10). With the large harvest, farmers added $4 billion of harvested crops to end-of-year inventories for later sale. Inclusion of the inventory change enables a full accounting of a current year's production in the tabulation of the calendar year's farm sector output (table 1-1, figs. 1-1 and 1-2).

At nearly $92 billion, the total value of livestock production in 1996 was $4.3 billion higher than in 1995, and the first increase in 3 years (fig. 1-3). Substantial increases in the sales of hogs, poultry, and dairy products more than offset a $4-billion decline in cattle production. Market prices available to farmers for hogs, poultry, and dairy were all up in 1996 (fig. 1-12). The $4-billion fall in cattle production stemmed from a $2.9-billion drop in receipts and a $1.1-billion decline due to a reduction in the herd (inventory adjustment). After having declined for the 3 prior years, beef prices stabilized near 1995 levels (fig. 1-11), but herd liquidation continued, as producers were caught in an ongoing cost-price squeeze without prospects of an immediate turnaround.

Production inputs purchased and used within the current production year, called **intermediate consumption outlays** in table 1-1, rose a modest $3.4 billion (3.1 percent) in 1996. Changes in individual components were not particularly noteworthy but were consistent with adjustments in production. Livestock purchases were down, reflecting a continuation of the downturn in the beef cycle. Expenditures related to crop production were generally up, in line with the increase in acreage planted (table 1-1).

Net government transactions, the flow of funds between the agricultural and government sectors, fell to under $1 billion in 1994. By 1995, this measure had fallen below $100 million, and declined further to $30 million in 1996. This decline reflects that the agricultural sector has recently paid the government (mostly State and local entities) nearly as much in taxes and fees as it received in (Federal) payments under various farm programs. Net government transactions reached a record high of $11 billion in 1987, in the midst of the farm sector's financial crisis (fig. 1-6). The significant decline in this measure is a reflection of both the general decrease in government payments (most of which were developed to support farm operator incomes) since 1987, and the steady growth in licensing fees and property taxes collected from the agricultural sector. (Income taxes are not included in the accounts because they are not incurred in production.) Government payments to the agricultural sector in 1996 fell to 44 percent of their record 1987 level, while the sector's payments to government entities reached 139 percent of their 1987 amount. Lower government payments in the 1990's (except for 1993) were due to the relatively high prices and low deficiency payments, partially the result of an expansion

in demand, including growth in exports of agricultural commodities.

Farm Marketing Receipts Up in 1996

World economic growth and trade liberalization are providing increased opportunities for U.S. exports, and this environment has translated into strong export growth for the U.S. crop and livestock sectors in the 1990's (see box on U.S. agricultural exports). In 1996, the value of marketings of all farm commodities rose $14.6 billion (table 1-2). Continuing an unbroken trend stretching back to 1987, cash receipts from sales of crops exceeded those of the previous year, having risen 42 percent since 1987. In contrast, livestock receipts rose in 1996 by $5.9 billion, after 2 years of decline (fig. 1-3). The increases in livestock receipts were powered by increases of $3.3 billion and $2.9 billion in sales of poultry and dairy products, respectively. Receipts from sales of meat animals declined slightly as a drop in cattle sales more than offset a $2.4-billion rise in hog sales.

Strong growth in U.S. grain use supported commodity prices, and 1996 was a favorable year for feed crop farmers, who planted more acres, benefited from higher yields, and sold their production at high prices. Both domestic and export demand were strong, with low carryin stocks. Corn and soybean sales were up an impressive $2.9 billion and $2.4 billion, respectively. Notable gains in sales were also achieved by wheat ($841 million), cotton ($610 million), greenhouse/nursery ($446 million), sorghum grain ($441 million), rice ($293 million), and potatoes ($235 million). Corn production, which typically represents close to one-fifth of crop sales value, contributed $6.1 billion to the rise in the value of crop production, as producers sold $3 billion more than in 1995 and added another $3.1 billion to yearend inventories for future sale. Soybeans also made a $2.9-billion contribution and, unlike corn, had almost no buildup in inventory.

With the notable exception of cattle, which are in the downward phase of their multiyear production cycle, 1996 was, financially speaking, a good year for producers of farm commodities. While not always at record levels, both prices and yields were generally favorable, putting farmers in the enviable position of having commodities to market when prices were at advantageous levels. This and the relatively small expansion, by recent historical standards, in total production expenses (3.1 percent) are key explanations for the $15.5-billion rise in **net farm income** (table 1-2 and fig. 1-1).

Agricultural Exports Surpass $60 Billion

U.S. agricultural exports were a record $60.4 billion in calendar year 1996, 8 percent higher than in 1995. Strong prices for grains and soybeans boosted bulk exports 12 percent to $28.1 billion, the highest since 1981. High-value product (HVP) exports reached a record $32.3 billion.

Bulk Exports Led Growth in 1996

In 1996, bulk exports accounted for much of the rise in U.S. agricultural export value. Even though export volume declined, higher grain and soybean prices boosted the export value to $28.1 billion. Corn export volume fell 13 percent, but increased prices raised the value 15 percent. Wheat shipments also declined, but export value surged 15 percent due to higher prices caused by tight supplies. Soybean volume, unlike grains, rose 12 percent to a record 25.6 billion tons in 1996. Soybean exports to China, Mexico, and Indonesia were especially strong, setting records in 1996. At $286 per ton, soybean export prices were nearly 21 percent higher than in 1995, boosting the total value of soybean shipments 36 percent. While cotton exports declined 26 percent in both volume and value, exports to Canada and Mexico were a record 64,000 tons and 150,000 tons, respectively.

HVP Exports Advance for Eleventh Consecutive Year

Although (HVP) exports continued an 11-year upward trend, they increased only 5 percent in 1996, primarily due to the slowdown in beef exports and small horticultural export gains. HVP gains were largely due to increased poultry meat, animal feed, and soybean meal exports. Poultry meat exports jumped 23 percent to a record $2.5 billion. Shipments to Russia were a record 937,000 tons. China represented a small but rapidly growing market for poultry meat in 1996. U.S. port exports also reached records, 306,000 tons and $1 billion in value. Exports of animal feeds and fodders advanced 5 percent to $2.6 billion in 1996. Sharply higher prices boosted the value of soybean meal exports 45 percent, to the highest level since 1988. U.S. horticultural product exports increased nearly 4 percent to about $9.9 billion, largely due to gains in wine and nuts. (See Economic Research Service, *Foreign Agricultural Trade of the United States*, January/February/March 1997 for additional details on 1996 agricultural exports. Agricultural trade information is also published in the Economic Research Service's *Outlook for U.S. Agricultural Exports*.)

Net cash income in 1996 also increased from 1995, but not as dramatically as the rise in net farm income. Farmers were able to build stocks from the excellent harvest in 1996. These accumulated stocks are reflected in net farm income for 1996 because the commodities are valued and booked as change in inventories, but the postponement of their sale moves cash income into future years. Since the valuation of inventory is not a market transaction, it is excluded from net cash income accounting. Despite the postponing of substantial crop sales into the next year, the gain of $15.6 billion in gross cash income was more than double the $6.8 billion in added cash expenses, resulting in a hefty 17.1-percent rise in 1996 net cash income from 1995.

Corn, Wheat, Soybeans, and Cotton Accounted for Three-Fourths of Increased Crop Receipts

Cash receipts for corn, which leads all other crops in total value marketed and provided 20 percent of the increase in receipts from all commodities, were $21.6 billion in 1996, surpassing the previous record of $18.6 billion in 1995 (table 1-4). Yet, the manner in which the two consecutive sales records were attained was very different. The modest, by recent standards, 7.4-billion-bushel corn crop produced in 1995 was 27 percent below 1994's record of 10.1 billion bushels. However, in 1994, market prices were depressed by the large harvests, and farmers retained sizable quantities in inventories for future sale. The resulting drawdown of the large unsold inventories held over from 1994's record crop permitted farmers to expand sales quantities in 1995. The smaller crop and strong demand for corn, especially for export, bolstered corn prices. Benefiting from prices that were rising throughout the year and continued upward into the post-harvest period, producers were able to boost corn revenues even with a smaller harvest (fig. 1-7).

The rebound in corn production in 1996, in combination with prices that were relatively strong during and after the harvest season, enabled corn sales to top that of the prior year. The net result was a $3-billion increase in sales from 1995. With the increased 1996 cash sales and another $3.1 billion of new corn production being added to yearend inventories, 1996 was a banner year for corn producers.

Wheat receipts were up $841 million in 1996, accounting for about 10 percent of the overall increase in crop receipts. Harvested acreage and yields were up slightly, resulting in increased production. Prices were higher for much of the year and remained strong throughout the year, boosting sales 9 percent from 1995 (fig. 1-8).

Soybeans were also a high spot for the U.S. agricultural sector in 1996, as acres, yield, and production were all up from the prior year, and prices received by farmers were at exceptionally high levels compared with 1994 and 1995, due to low inventories and short supplies (fig. 1-9). Soybean receipts increased a whopping $2.4 billion, an amount equivalent to 27 percent of the net increase in crop revenues. A change of this magnitude is particularly noteworthy, simply because corn is usually the only crop for which the annual change can be expected to approach, much less exceed, $2 billion.

Cotton sales for 1996 were up $610 million, equivalent to 7 percent of the total increase in the value of crop sales. Cotton acreage was down, but yields were up 30 percent, leading to increased production. Prices did not fall dramatically in the face of the rebound in production, the result being a 9-percent rise in cotton sales (fig. 1-10). Given that acres planted were down almost 14 percent, producers experienced a considerable improvement in their returns.

Vegetable Receipts Declined in 1996

With the notable exceptions of potatoes, dry beans, cucumbers, and chili peppers, cash receipts from the sale of vegetables were generally down in 1996. Lettuce suffered the largest decline in value, $563 million or 28 percent, compared with 1995. In 1995, cash receipts from lettuce had soared to 56 percent above those of 1994 as prices spiked to exceptional levels due to short supplies caused by adverse weather. Unusual spring floods in the Salinas Valley of California in 1995 lowered lettuce production, and market prices approached $50 per hundredweight cut for several months. With the pervasiveness of salad bars in restaurants and the introduction of packaged pre-cut lettuce in grocery stores, strong demand for lettuce continued despite rising prices. In 1996, the lettuce harvest rebounded and prices retreated. Although lettuce growers brought only about 6 percent more product to the market than in 1995, these additional market offerings were enough to cause head lettuce prices to drop almost 37 percent (nearly back to their 1994 level). California and Arizona accounted for 97 percent of 1996 lettuce receipts.

More than 47 percent of U.S. cash receipts from vegetables come from California and Florida. Cash

receipts from vegetables represent about 32 percent of California's cash receipts from all crops and 26 percent of Florida's. Cash receipts from potatoes enable Idaho and Washington to follow Florida in importance as vegetable-producing States. Potatoes were Idaho's leading commodity in cash receipts, generating more than 21 percent of the State's total cash receipts from all commodities.

Fruits and Nuts Contributed to Expanded Farm Sector Receipts

U.S. fruit and nut receipts in 1996 rose 6 percent from 1995, with a 7-percent increase in noncitrus fruit receipts and a less-than-1-percent increase in citrus receipts. In 1996, grapes, apples, oranges, and almonds showed strong domestic and international demand in the fresh and processed markets.

Grapes, the United States' leading fruit and nut commodity in value of cash receipts, are experiencing a remarkable boost in export demand, especially for wine varieties. The U.S. wine industry has become increasingly important to U.S. agriculture. Nearly 55 percent of the 1996 grape crop was used for wine. In 1996, grapes ranked 15th according to each commodity's contribution to U.S. agricultural cash receipts, ahead of apples and oranges, but also ahead of such crops as rice and barley (table 1-4). Total U.S. grape receipts were up 14 percent, with wine receipts reflecting a 24-percent increase in 1996, raisin varieties a 10-percent increase, and fresh table grapes a 5-percent increase from 1995. Receipts were up, reflecting higher grower prices resulting from lower utilized production and increased consumer demand. Prices to growers increased 17 percent for fresh use and 16 percent for processing uses. U.S. grapes are also important to the world's supply. The U.S. agricultural sector contributes 10 percent of the world's grape output, the third largest after Italy and France.

Receipts for the United States' second most important fruit commodity, apples, increased 17 percent to $1.8 billion in 1996, the highest in the past 5 years. A short supply on the East Coast and strong exports to East Asia helped raise grower prices. Record fresh use of apples has been noted, as well, due to a large crop and excellent quality. A smaller crop for fresh market apple utilization on the East Coast, due to weather and pollination problems, lowered production in some key States.

U.S. orange receipts rose 5 percent in 1996 to $1.8 billion, setting a record for the latest 5-year period. Quality problems with navels and a strong domestic demand for Valencias lowered the export supply. Domestic demand for fresh-market Valencias was especially high, increasing Valencia receipts 25 percent.

Almond receipts climbed to over $1 billion in 1996. Almonds, ranking 23rd among the U.S. leading commodity receipts, are showing growth in domestic and international markets. The United States is the world's largest producer and exporter of almonds.

Cattle Receipts Down Again in 1996

Cattle and calves remained the top-ranked commodity in generation of cash receipts (table 1-3) for 1996, comprising 15 percent of all commodities, even though their value of sales fell $2.9 billion, or 8.4 percent. Following trend, the sales value of cattle and calves has declined by $8.2 billion, or 21 percent, since 1993 due to lower prices (fig. 1-11). Historically, cattle production and the related herd size follows a multiyear cycle and indications are that cattle are in the downward phase of that cycle.

Increases in poultry, pork, and dairy product sales prevented livestock receipts from falling for the third consecutive year in 1996. Poultry sales have been on the upward trend for the last decade and experienced an unusually large jump in 1996. Long-term per capita consumption trends indicate increased consumer demand for poultry meat. Increasing diet awareness among consumers may be a factor contributing to increased poultry consumption.

While the adoption of large-scale production and marketing practices similar to those employed in broiler production over the last several decades are thought to be lowering production costs for hogs, increased prices throughout 1996 appeared to be the key factor in increasing the value of pork sales in 1996 (fig. 1-12) and in increasing producer returns over 1995 (see Part II: Costs of Production—Major Field Crops, Livestock, and Dairy).

Total Expenses for Purchased Inputs and Services Rose 3 Percent in 1996

Total expenses for purchased inputs, such as feed and fertilizer, and services, such as repairs and custom work—called **"intermediate consumption outlays"** in

table 1-1—were estimated at $112.4 billion in 1996, up $3.4 billion (3.1 percent) from 1995. This year's increase was the smallest in the last 4 years. Feed expenses rose $1.4 billion, or equivalent to 42 percent of the total increase, leading all other input and service expense items, which also expanded in 1996. Increases in items directly related to crop production—fertilizer and lime, pesticides, and seeds—followed in order as the major contributors to expanding expenses. Since the early 1980's, the ratio of "intermediate consumption outlays" to the agricultural sector's final output has remained close to 50 percent. Farm production has become more dependent upon purchased inputs and services during the last decade and a half than during 1960-79 and 1950-59, when "intermediate consumption outlays" to the agricultural sector's final output averaged 45 percent and 38 percent, respectively.

Feed Expenses Rise Again in 1996

Estimated expenditures for feed were $25.2 billion in 1996, up $1.4 billion (5.9 percent) from a revised estimate of $23.8 billion in 1995. Feed costs in 1995 were $1.2 billion (5.3 percent) more than in 1994. This makes 1996 the fifth straight year that feed expenses have risen significantly, and the fourth straight year that their rise has been the largest increase among production expenses. This pattern is likely due to shifts in the structure and location of animal production, which have increased the percentage of purchased feed to all feed. A larger proportion of animals is being raised on large, specialized operations that buy most of their feed. In addition, dairy and hog production have expanded in the Southwest and Mountain areas where raising feedstuffs other than hay is uneconomical.

In each of the last 2 years, a combination of large animal stocks and increased reliance on purchased feed has been the major reason for increased outlays for livestock feed. Relatively low feed prices during the last quarter of 1994 and the first half of 1995 encouraged many livestock, dairy, and poultry producers to expand already relatively high inventory and production levels. This expansion made them vulnerable to record-high grain and soybean prices in the last quarter of 1995 and most of 1996, when USDA's feed price index rose nearly 24 percent.

Although beef producers accelerated herd reduction during the current cattle cycle's liquidation phase that began in late 1995, and hog producers continued a reduction in numbers that also began in 1995, ERS' estimate of grains and processed feed consumed was down only 4.2 percent for calendar year 1996. The large animal numbers, already in place when feed price increases hit, forced livestock producers to continue to expend large amounts for purchased feed, despite the direction toward reducing cattle and hog numbers. Furthermore, unfavorable weather conditions in early 1996 reduced forage supplies in the Southern Plains, forcing supplemental feeding of hay. Heavier demand for forage and hay and reduced hay production in 1996 drove supplies to extremely low levels in the second half of 1996, bidding up the price of existing stocks.

Livestock and Poultry Purchases Fell with Lower Feeder Cattle Prices

Total livestock and poultry purchases fell $1.2 billion (9.6 percent) in 1996 to $11.1 billion. The value of interstate sales of cattle and calves,[2] which constitute 75 percent of all livestock and poultry purchases, fell $1.4 billion (14.4 percent). This is the third straight year that interstate sales of cattle and calves have fallen more than $1 billion. Expenditures for cattle and calves in 1996 were down $3.9 billion (32 percent) from their previous peak in 1993. As in 1994, both total liveweight and average value per cwt were down in 1996. In 1995, total liveweight rose 5 percent, but the average value fell 14 percent. In 1996, the average value fell another 9.4 percent in response to record high prices for grain and continuing low beef prices (consistent with increased beef production due to unusually high slaughter rates).

The value of interstate sales of breeding hogs and feeder pigs increased 37 percent in response to a 17-percent increase in liveweight and an 18-percent jump in the average price. Total chick and poult purchases rose 3 percent as the poultry sector continued to expand.

Crop Production Expenses Rose with Larger Acreage

Increases in crop acreage, particularly the 11.6-percent expansion in corn acreage, was the dominant factor in increased crop input expenses in 1996. **Seed expenses** were $6.1 billion, up 11.9 percent from 1995. USDA's seed prices paid index (primarily hybrid corn) rose 5 percent. The remainder of the increase in seed costs was attributable to increased acreage.

[2]Interfarm sales of cattle and calves within the same State are counted as neither receipts nor expenses. In effect, each State is treated as a big farm and the transactions would offset one another.

Estimated **fertilizer and soil conditioner** expenditures were $10.9 billion in 1996, up 9 percent from 1995. This was the third consecutive year that the increase in fertilizer expenses exceeded 9 percent. Significant price increases in 1994 and 1995 raised the fertilizer prices paid index (aggregate of all fertilizer) 25 percent and accounted for much of the increase in fertilizer expenses. The price index rose only 3.3 percent in 1996, so the principal cause of the 1996 increase was acreage increases, particularly for corn acreage. At 1995 application rates (1996 rates are not available), the increase in fertilizer use on corn would account for more than 60 percent of the increase in quantities applied. Fertilizer expenses have now risen each year since 1992.

Expenditures for **pesticides** were estimated at $8.5 billion, 10.3 percent higher than 1995's $7.7 billion. This was the largest increase since the 17.8-percent jump in 1991. The pesticide prices paid index rose 3.5 percent. Expanded acreage accounted for the rest. Herbicides constitute between 65 and 70 percent of pesticides applied and are the principal pesticides used on corn. The combination of expanded acreage and the rise in USDA's herbicide subcomponent prices paid index would have indicated a 10.5-percent increase in herbicide expenditures. Pesticide expenses have been climbing steadily since 1988.

The estimate of expenditures for **petroleum fuel and oils** was $5.7 billion, up 5.3 percent from the revised 1995 estimate of $5.4 billion. Gasoline and diesel fuel prices rose sharply beginning in April due to shortages that occurred after particularly harsh winter weather.

Contract labor expenses were $2.1 billion in 1996, up 8.1 percent, approximately the same increase as in 1995. Wage rates for agricultural service workers in California, which employs more than 30 percent of such workers, rose 2.5 percent. Contract labor is treated differently from hired labor because employment is through an intermediary that makes the arrangements and handles the administrative functions, which qualifies the activity as a separate business—providing services to the employing business. Under the Department of Commerce's National Income Accounts, contract labor is classified as being part of the service sector as distinct from the agricultural sector.

Other intermediate product expenses presented a mixed picture. **Repair and maintenance** of farm business assets increased 8.9 percent, led by an 8-percent rise in motor vehicle and machinery repair and maintenance. Machine hire and custom work expenses, based on survey results, were estimated at $4.7 billion, down 2.1 percent from 1995. Both machinery and equipment leasing and crop-related custom work outlays were lower.

Marketing, storage, and transportation expenses fell 5 percent to $6.8 billion. Transportation rates for agricultural products were down. Rail and truck rates were up slightly, but barge rates for farm products on the Mississippi River fell 25 percent from abnormally high 1995 rates. The volume of grain and fresh fruit and vegetable shipments was down around 12 percent. The Bureau of Labor Statistics index of farm product warehousing and storage costs fell 1.5 percent and the volume of commodities stored was less, given the smaller 1995 harvest, which would be reflected in the 1996 expenses. The price index for packaging and containers in the general economy was almost 4 percent lower, so the cost to the agricultural sector was probably less as well.

Miscellaneous expenses totaled $17.6 billion, down 1.4 percent from a revised 1995 estimate of $17.8 billion. The only significant increases were in estimated outlays for custom feeding (12.1 percent) and general management expenses (1.5 percent), where a 9.6-percent rise in gross insurance expenses offset an 8.5-percent decrease in other management expenses. Estimated expenditures for livestock services and supplies, tools and shop equipment purchases, and irrigation water were all down.

Expenditures To Acquire Services of Factors of Production Rose 9 Percent in 1997

Employee compensation for hired labor was $15.2 billion in 1996, $872 million higher than in 1995. The 6.1-percent increase was similar to the 6.2-percent increase in 1995. A large jump in perquisites (noncash benefits) was reflected in the 1995 increase in total labor expenses. USDA's wages index rose 3.6 percent as the average hourly wage earned by all types of hired workers went from $6.54 to $6.78. The 1996 increase in the wages index was the largest since 1992, and there are signs that wage rates are increasing faster. October 1996 wage rates were 5.9 percent above October 1995, and increases in the first three quarters of 1997 over the same quarters in 1996 were all greater than 4 percent.

Net rent to nonoperator landlords in 1996 was $14.3 billion, up 19.3 percent from 1995. An important part of the increase was due to a $2.7-billion (33 percent) increase in share rents corresponding with the sector's higher value of production. About $1.9 billion of the increase was in corn for grain. Total landlord gross income, excluding forest products to nonoperators, was $20.6 billion, up 16 percent. Cash rent was $7.7 billion, up 3.3 percent, as cash rent rates and acres rented both rose. Direct government payments received by landlords were $1.3 billion, the same as in 1995. Expenses paid by all landlords, including capital consumption, were $7.2 billion, up 6 percent. Crop inputs financed by landlords rose 26 percent to $1.7 billion. Property taxes paid by landlords were $2.4 billion, up 3 percent from 1995. Nonoperator landlords netted $12.1 billion, up 24 percent from 1995. Forest product receipts credited to other nonoperator landlords added another $2.2 billion.

Total interest expenses were $13.2 billion, up 3.9 percent from 1995. Interest costs incurred on nonreal estate debt were $6.9 billion, up 2.6 percent from 1995. However, nonreal estate interest, excluding interest on Commodity Credit Corporation (CCC) loans, rose 4.6 percent. Repayment of CCC loans returned to normal levels after a particularly heavy retirement of CCC debt in 1995. Operators paid $109 million in interest on CCC debt in 1996, down from $232 million in 1995. Interest on real estate debt was $6.4 billion, up 5.2 percent from 1995.

Interest expenses have risen in each of the last 3 years after a long string of decreases from 1983 to 1993. However, the $492-million increase in 1996 was about half the dollar increases in 1994 and 1995. The 3.9-percent rate of growth in interest expenses in 1996 was less than half the 8.4-percent rate of increase in the previous 2 years. The smaller increase in interest expenses in 1996 is primarily attributable to a slower rise in interest rates between 1995 and 1996. Nonreal estate interest rates rose less than one-half percent, after increasing around 7 percent in the previous 2 years, and real estate interest rates rose 1.6 percent, resulting in a weighted-average increase of 1.1 percent.

The 1996 rise in average farm business debt was the sixth increase since a small decrease in 1990. In each year during this period, average debt has risen slightly more. Average nonreal estate debt, excluding CCC loans, increased $2.7 billion (3.9 percent) in 1996. This was the third straight rise of $2.7 billion in average nonreal estate debt. Average nonreal estate debt has risen every year since 1989 but at varying rates. From 1994 to 1996, average nonreal estate debt rose $8.3 billion, after rising $3 billion between 1989 and 1993. Average real estate debt increased $2.1 billion (2.5 percent) in 1996. Average real estate debt has also been rising at an increasing rate since 1991.

Property Taxes and Capital Consumption Were Little Changed in 1996

Property taxes paid continued their pattern of slow, steady growth in 1996, increasing 1.6 percent to $6.8 billion. Real estate tax payments were estimated up 4.3 percent to $6.3 billion. In both 1995 and 1996, personal property taxes have fallen. After three year-to-year declines between 1978 and 1984, property tax payments have risen every year except 1991. Taxes do not respond immediately to changes in the value of real estate and other property because they are set by legislation and reassessments of property values are periodic. However, the steady rise in tax payments corresponds to the overall improvement in real estate values and reflects the capacity of operations to pay assessed taxes in a timely manner.

Total capital consumption, including operator dwellings, was estimated at $18.9 billion, up $15 million from 1995. Capital consumption for farm business items only, excluding operator dwellings, was down 0.8 percent at $16.2 billion. However, operator dwelling capital consumption rose more than 5.4 percent due to rising operator dwelling values. Interestingly, the ratio of capital consumption to net cash income, which measures the portion of net income that should be reserved for capital replacement, has been fairly stable since 1987 at the 1955-70 level, while capital expenditures as a percentage of net cash income have been slowly rising since 1986.

Despite an improved farm economy and lower interest rates, a number of factors have worked to hold new capital expenditures down. Farmers are continuing the trend of maintaining and repairing machinery and equipment and keeping items in service longer. This trend began in the early 1980's when capital expenditures began to fall off dramatically. The percentage of total production expenses for repair and maintenance has been fairly constant since then. More farmers are leasing equipment or contracting with others for custom work. Adoption of conservation tillage has

reduced demand for tillage equipment and lowered the horsepower requirement per acre planted for farms using these technologies.

Capital consumption of service buildings has decreased steadily since 1981, except for a small increase in 1995, as new expenditures fell as low as one-third of their 1979 peak. In 1996, service building construction rose nearly $600 million to $2.3 billion, about the same level as in 1982.

Tractor and farm machinery capital consumption in 1996 was estimated at $10.7 billion, down 1.2 percent from 1995. After reaching a low point in 1987, tractor and farm machinery capital consumption climbed a little more than $1 billion to 1990. Since then, it has been essentially level, varying less than $250 million per year. Almost all of the increase from 1987 to 1990 was due to increases in tractor capital consumption, which has continued upward at a very slow rate. The overall increase in tractor capital consumption is due to both the climb in the average price of tractors, which elevates their replacement value, and increased purchases. Capital consumption of farm machinery and equipment was flat from 1987 to 1995, but fell more than $200 million in 1996 due to the smallest increase in the prices paid for machinery and equipment since 1987. Estimated investment in machinery and equipment in 1996 reached its highest point since 1990 at $5.5 billion, an increase of $450 million (8.8 percent) from 1995. Machinery and equipment purchases have stayed between $5.1 billion and $5.5 billion each year since 1991, after large increases in 1989 and 1990.

Figure 1-1

Net value added, net farm income, and net cash income, 1992-96

Net value added and net farm income rose substantially in 1996

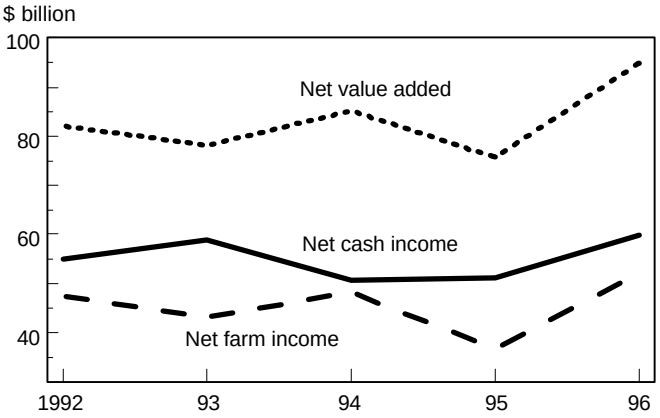

Figure 1-2

Net value added by farm sector and shares to farm operator and nonoperator participants, 1992-96

Farm operator and nonoperator participants all shared in increased value added for 1996

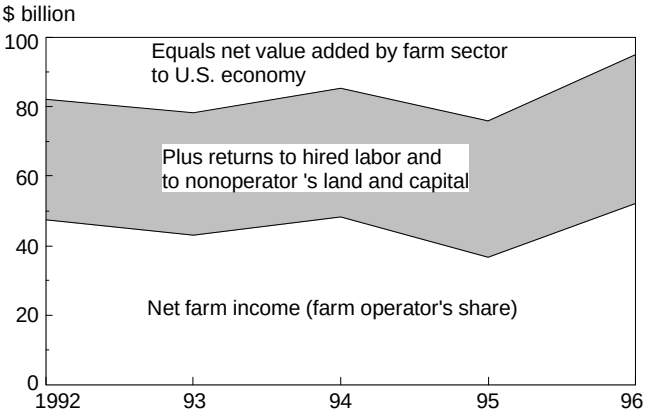

Figure 1-3

Final crop and animal output, 1990-96

Crops were larger share of agricultural sector output between 1994 and 1996

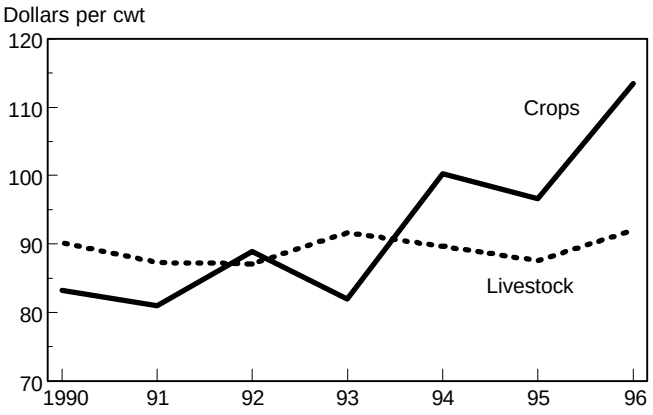

Figure 1-4

Corn, soybeans, and wheat production, 1990-96

Although not records, increased corn and soybean production in 1996 boosted final crop output

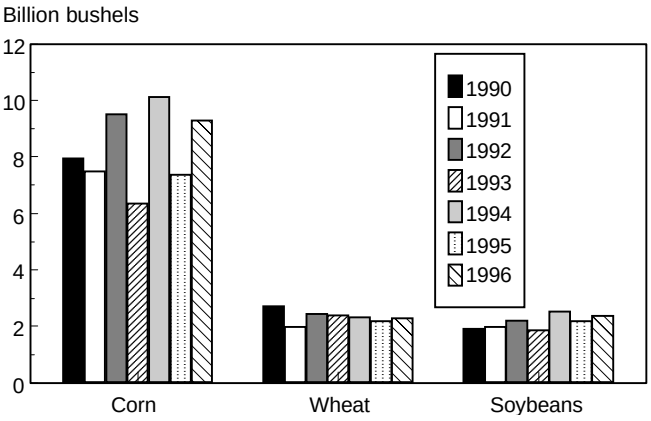

Figure 1-5

Final agricultural sector output and intermediate consumption outlays, 1990-96

Sector output rose rapidly in 1996, while expenses paid to other sectors increased modestly

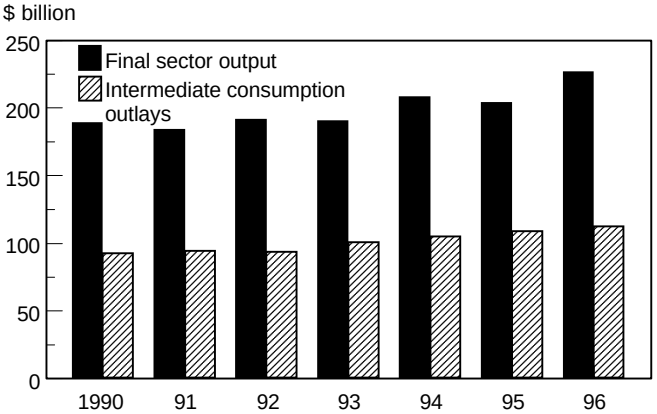

Figure 1-6

Direct government payments and farm sector payments to government, 1980-96

Net government transactions nearly zero in 1995-96 for the first time since 1982

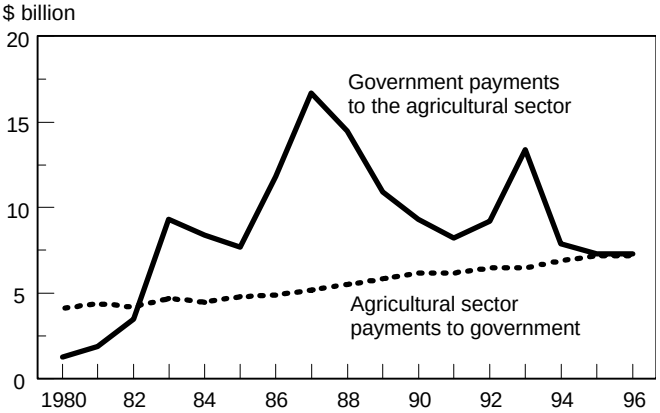

Figure 1-7

Monthly corn prices, 1994-96

Higher corn prices over most of 1996, plus a larger harvest, contributed to rise in cash receipts

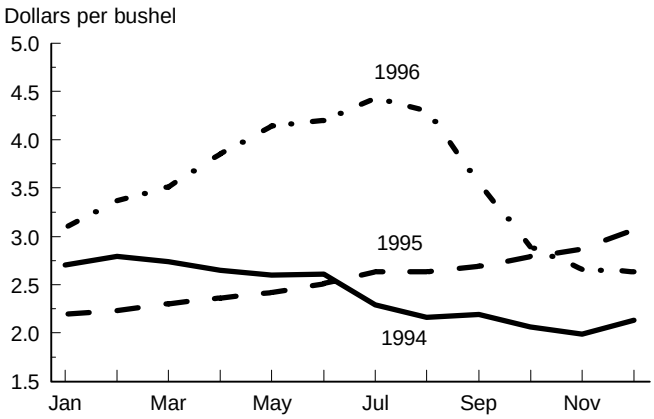

Figure 1-8

Monthly wheat prices, 1994-96

Higher wheat prices for much of 1996, with slightly larger acreage and yields, boosted receipts

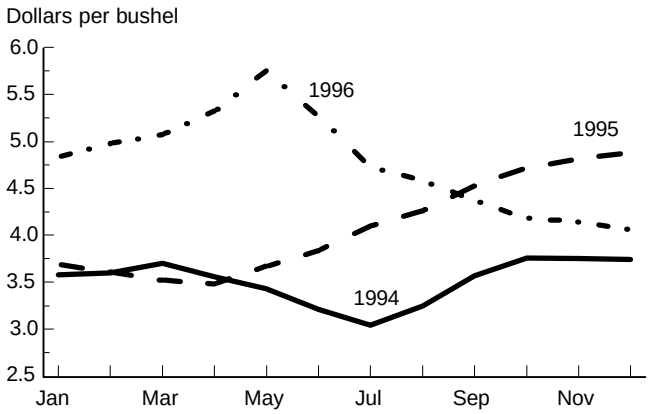

Figure 1-9

Monthly soybean prices, 1994-96

Soybean prices rose in 1996 and remained above 1995 despite large harvest

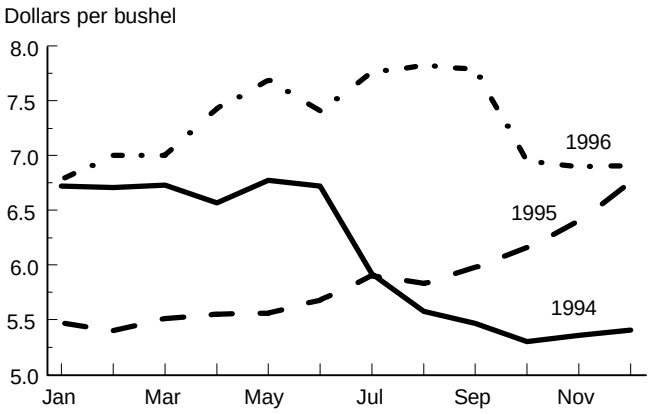

Figure 1-10

Monthly upland cotton prices, 1994-96

Cotton prices in 1996 remained strong even with bigger crop, contributing to rise in receipts

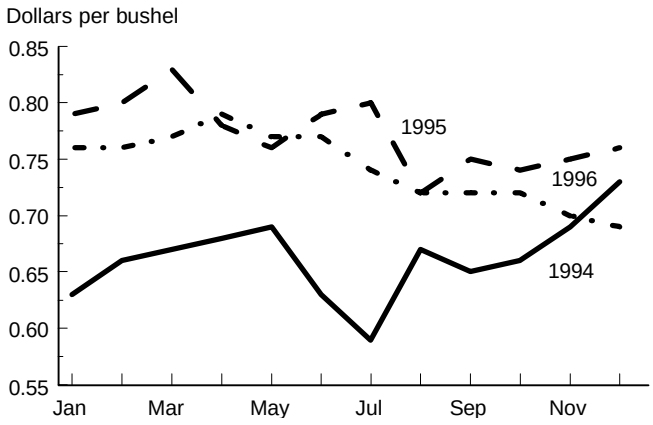

Figure 1-11

Monthly beef prices, 1994-96

Beef prices lower for much of 1996, recovering slightly at year's end

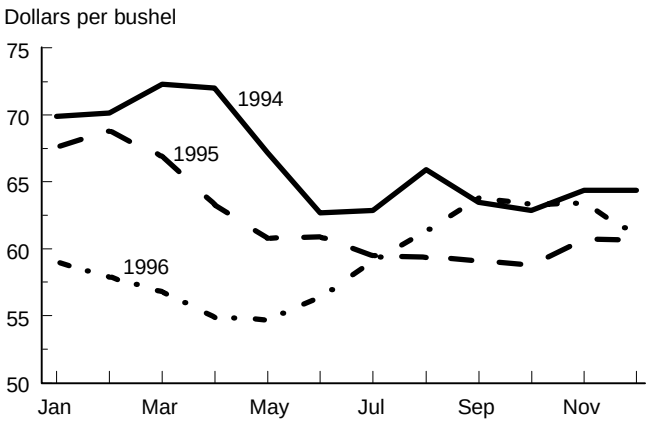

Figure 1-12

Monthly hog prices, 1994-96

Higher 1996 hog prices support value of animal output, offsetting lower cattle sales

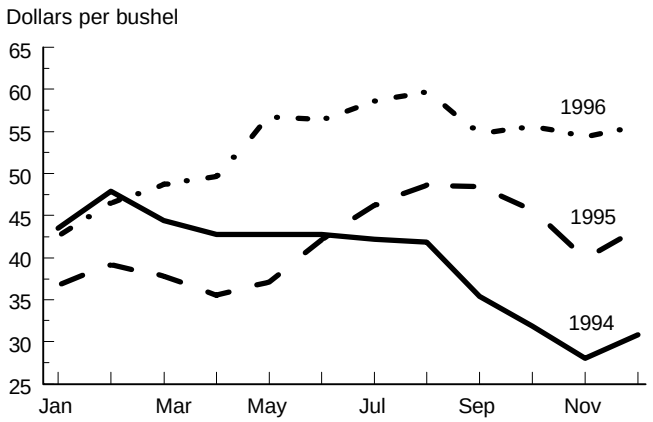

Table 1-1—Value added to the U.S. economy by the agricultural sector via the production of goods and services, 1992-96[1]

Item	1992	1993	1994	1995	1996	Change, 1995-96 Amount	Change, 1995-96 Percent
	Thousand dollars					*Million dollars*	*Percent*
Final crop output	89,036,487	81,966,590	100,285,791	96,655,403	113,512,267	16,857	17.4
Food grains	8,467,473	8,179,932	9,545,012	10,416,611	11,549,958	1,133	10.9
Feed crops	20,098,600	20,211,046	20,351,200	24,282,381	28,113,655	3,831	15.8
Cotton	5,192,067	5,249,680	6,737,709	6,851,079	7,460,813	610	8.9
Oil crops	13,285,937	13,219,881	14,656,680	15,466,338	17,755,891	2,290	14.8
Tobacco	2,958,005	2,947,785	2,656,352	2,548,399	2,795,990	248	9.7
Fruits and tree nuts	10,178,673	10,284,137	10,334,702	11,073,919	11,713,819	640	5.8
Vegetables	11,851,388	13,434,608	13,902,047	14,890,935	14,348,758	-542	-3.6
All other crops	13,711,536	13,952,700	14,895,257	15,170,425	15,685,894	515	3.4
Home consumption	115,518	68,578	71,815	104,286	91,503	-13	-12.3
Value of inventory adjustment[2]	3,177,290	-5,581,757	7,135,017	-4,148,970	3,995,986	8,145	—
Final animal output	87,089,180	91,690,983	89,681,596	87,617,240	91,963,245	4,346	5.0
Meat animals	47,748,299	50,823,492	46,784,612	44,827,596	44,382,498	-445	-1.0
Dairy products	19,736,250	19,242,553	19,935,161	19,893,610	22,833,925	2,940	14.8
Poultry and eggs	15,523,553	17,325,621	18,445,009	19,068,774	22,326,291	3,258	17.1
Miscellaneous livestock	2,628,877	2,778,811	2,995,146	3,213,776	3,371,498	158	4.9
Home consumption	473,969	450,631	409,205	365,100	333,022	-32	-8.8
Value of inventory adjustment[2]	978,232	1,069,875	1,112,463	248,384	-1,283,989	-1,532	—
Services and forestry	15,178,596	16,583,167	17,881,849	19,374,713	20,736,536	1,362	7.0
Machine hire and customwork	1,786,650	1,864,790	2,070,810	1,927,653	2,153,757	226	11.7
Forest products sold	2,177,753	2,555,263	2,742,869	2,939,262	2,918,157	-21	-0.7
Other farm income	4,208,708	4,608,891	4,392,376	5,213,331	5,893,636	680	13.0
Gross imputed rental value of farm dwellings	7,005,485	7,554,223	8,675,794	9,294,467	9,770,986	477	5.1
Final agricultural sector output	191,304,263	190,240,740	207,849,236	203,647,356	226,212,048	22,565	11.1
less: Intermediate consumption outlays	93,541,914	100,565,154	104,905,582	109,011,103	112,387,179	3,376	3.1
Farm origin	38,620,492	41,193,584	41,276,993	41,627,934	42,494,681	867	2.1
Feed purchased	20,132,962	21,431,234	22,631,209	23,829,253	25,234,461	1,405	5.9
Livestock and poultry purchased	13,574,171	14,597,315	13,270,118	12,335,346	11,148,086	-1,187	-9.6
Seed purchased	4,913,359	5,165,035	5,375,666	5,463,335	6,112,134	649	11.9
Manufactured inputs	22,710,022	23,146,902	24,398,465	26,175,192	28,393,261	2,218	8.5
Fertilizers and lime	8,330,712	8,397,508	9,179,677	10,032,994	10,934,178	901	9.0
Pesticides	6,470,627	6,723,326	7,225,032	7,726,463	8,525,120	799	10.3
Petroleum fuel and oils	5,298,422	5,349,809	5,312,044	5,447,664	5,736,339	289	5.3
Electricity	2,610,261	2,676,259	2,681,712	2,968,071	3,197,624	230	7.7
Other intermediate expenses	32,211,400	36,224,668	39,230,124	41,207,977	41,499,237	291	0.7
Repair and maintenance of capital items	8,470,675	9,193,138	9,082,921	9,458,412	10,303,718	845	8.9
Machine hire and customwork	3,781,693	4,420,056	4,789,845	4,791,726	4,691,963	-100	-2.1
Marketing, storage, and transportation expenses	4,541,289	5,648,396	6,820,594	7,180,481	6,817,878	-363	-5.0
Contract labor	1,717,422	1,770,956	1,805,440	1,969,054	2,128,835	160	8.1
Miscellaneous expenses	13,700,321	15,192,122	16,731,324	17,808,304	17,556,843	-251	-1.4
plus: Net government transactions	2,691,362	6,862,948	974,270	74,466	29,527	-45	-60.3
+ Direct government payments	9,168,920	13,402,015	7,879,129	7,253,372	7,285,541	32	0.4
- Motor vehicle registration and licensing fees	360,543	362,030	414,967	461,750	428,262	-33	-7.3
- Property taxes	6,117,015	6,177,037	6,489,892	6,717,156	6,827,752	111	1.6
Gross value added	100,453,711	96,538,534	103,917,924	94,710,719	113,854,396	19,144	20.2
less: Capital consumption	18,309,531	18,377,761	18,688,225	18,914,273	18,929,540	15	0.1
Net value added	82,144,180	78,160,773	85,229,699	75,796,446	94,924,856	19,128	25.2
less: Factor payments	34,607,270	35,065,904	36,958,278	39,057,112	42,730,493	3,673	9.4
Employee compensation (total hired labor)	12,282,246	13,235,320	13,503,184	14,346,758	15,219,042	872	6.1
Net rent received by nonoperator landlords	11,187,500	11,009,084	11,719,877	11,983,988	14,293,127	2,309	19.3
Real estate and nonreal estate interest	11,137,524	10,821,500	11,735,217	12,726,365	13,218,324	492	3.9
Net farm income	47,536,909	43,094,869	48,271,420	36,739,334	52,194,363	15,455	42.1

— = Not applicable.

[1]Final sector output is the gross value of the commodities and services produced within a year. Net value added is the sector's contribution to the national economy and is the sum of the income from production earned by all factors of production. Net farm income is the farm operator's share of income from the sector's production activities. The concept is consistent with that employed by the Organization for Economic Cooperation and Development.

[2]A positive value of inventory change represents current-year production not sold by December 31. A negative value is an offset to production from prior years included in current year's sales.

Source: Economic Research Service, U.S. Department of Agriculture.

Table 1-2—United States: Farm income indicators, 1992-96

Item	1992	1993	1994	1995	1996	Change, 1995-96 Amount	Change, 1995-96 Percent
	Thousand dollars					*Million dollars*	*Percent*
Gross farm income	200,473,183	203,642,755	215,728,365	210,900,728	233,497,589	22,597	10.7
Gross cash income	188,722,689	200,081,205	198,324,071	205,037,461	220,590,081	15,553	7.6
Farm marketings	171,380,658	177,650,246	181,238,887	187,703,843	202,338,990	14,635	7.8
Crops	85,743,679	87,479,769	93,078,959	100,700,087	109,424,778	8,725	8.7
Livestock and products	85,636,979	90,170,477	88,159,928	87,003,756	92,914,212	5,910	6.8
Government payments	9,168,920	13,402,015	7,879,129	7,253,372	7,285,541	32	0.4
Farm-related income	8,173,111	9,028,944	9,206,055	10,080,246	10,965,550	885	8.8
Noncash income	7,594,972	8,073,432	9,156,814	9,763,853	10,195,511	432	4.4
Value of home consumption	589,487	519,209	481,020	469,386	424,525	-45	-9.6
Rental value of dwellings	7,005,485	7,554,223	8,675,794	9,294,467	9,770,986	477	5.1
Operator and other dwellings[1]	6,514,859	7,124,874	8,241,493	8,731,846	9,156,132	424	4.9
Hired laborer dwellings	490,626	429,349	434,301	562,621	614,854	52	9.3
Value of inventory adjustment	4,155,522	-4,511,882	8,247,480	-3,900,586	2,711,997	6,613	
Total production expenses	152,936,274	160,547,886	167,456,945	174,161,394	181,303,225	7,142	4.1
Intermediate product expenses	92,185,035	99,156,228	103,515,109	107,503,799	110,686,606	3,183	3.0
Farm origin	38,620,492	41,193,584	41,276,993	41,627,934	42,494,681	867	2.1
Feed purchased	20,132,962	21,431,234	22,631,209	23,829,253	25,234,461	1,405	5.9
Livestock and poultry purchased	13,574,171	14,597,315	13,270,118	12,335,346	11,148,086	-1,187	-9.6
Seed purchased	4,913,359	5,165,035	5,375,666	5,463,335	6,112,134	649	11.9
Manufactured inputs	22,710,022	23,146,902	24,398,465	26,175,192	28,393,261	2,218	8.5
Fertilizer and lime	8,330,712	8,397,508	9,179,677	10,032,994	10,934,178	901	9.0
Pesticides	6,470,627	6,723,326	7,225,032	7,726,463	8,525,120	799	10.3
Fuel and oil	5,298,422	5,349,809	5,312,044	5,447,664	5,736,339	289	5.3
Electricity	2,610,261	2,676,259	2,681,712	2,968,071	3,197,624	230	7.7
Other	30,854,521	34,815,742	37,839,651	39,700,673	39,798,664	98	0.2
Repair and maintenance	8,470,675	9,193,138	9,082,921	9,458,412	10,303,718	845	8.9
Other miscellaneous	22,383,846	25,622,604	28,756,730	30,242,261	29,494,946	-747	-2.5
Interest	11,137,524	10,821,500	11,735,217	12,726,365	13,218,324	492	3.9
Real estate	5,742,274	5,488,616	5,781,610	6,041,533	6,356,574	315	5.2
Nonreal estate	5,395,250	5,332,884	5,953,607	6,684,832	6,861,750	177	2.6
Contract and hired labor expenses	13,999,668	15,006,276	15,308,624	16,315,812	17,347,877	1,032	6.3
Net rent to nonoperator landlords[2]	11,187,500	11,009,084	11,719,877	11,983,988	14,293,127	2,309	19.3
Capital consumption	18,309,531	18,377,761	18,688,225	18,914,273	18,929,540	15	0.1
Property taxes	6,117,015	6,177,037	6,489,892	6,717,156	6,827,752	111	1.6
Net farm income[3]	47,536,909	43,094,869	48,271,420	36,739,334	52,194,363	15,455	42.1
Gross receipts of farms	193,958,324	196,517,881	207,486,872	202,168,882	224,341,457	22,173	11.0
Farm production expenses	148,871,592	156,490,454	162,980,647	169,348,115	176,064,087	6,716	4.0
Nonfactor payments	114,625,269	121,773,299	126,419,705	130,713,995	133,769,246	3,055	2.3
Intermediate product expenses	91,315,202	98,332,019	102,565,703	106,551,408	109,476,374	2,925	2.7
Capital consumption	16,102,700	16,164,380	16,321,303	16,311,971	16,186,890	-125	-0.8
Property taxes	5,489,945	5,505,944	5,727,259	5,881,562	5,977,147	96	1.6
Contract labor	1,717,422	1,770,956	1,805,440	1,969,054	2,128,835	160	8.1
Factor payments	34,246,322	34,717,155	36,560,941	38,634,120	42,294,842	3,661	9.5
Interest	10,776,576	10,472,751	11,337,880	12,303,373	12,782,673	479	3.9
Hired labor compensation	12,282,246	13,235,320	13,503,184	14,346,758	15,219,042	872	6.1
Net rent to nonoperator landlords	11,187,500	11,009,084	11,719,877	11,983,988	14,293,127	2,309	19.3
Returns to operators[4]	45,086,732	40,027,427	44,506,225	32,820,767	48,277,370	15,457	47.1
Gross cash income	188,722,689	200,081,205	198,324,071	205,037,461	220,590,081	15,553	7.6
Cash expenses	133,646,463	141,246,959	147,600,019	153,859,697	160,649,172	6,789	4.4
Cash expenses, excluding net rent	121,086,457	128,883,363	134,500,973	140,482,829	144,951,724	4,469	3.2
Intermediate product expenses	91,315,202	98,332,019	102,565,703	106,551,408	109,476,374	2,925	2.7
Interest	10,776,576	10,472,751	11,337,880	12,303,373	12,782,673	479	3.9
Cash labor expenses	13,504,734	14,572,649	14,870,131	15,746,486	16,715,530	969	6.2
Property taxes	5,489,945	5,505,944	5,727,259	5,881,562	5,977,147	96	1.6
Net rent to nonoperator landlords[5]	12,560,006	12,363,595	13,099,045	13,376,869	15,697,448	2,321	17.3
Net cash income	55,076,226	58,834,246	50,724,052	51,177,764	59,940,909	8,763	17.1

[1]Value added to gross income. Value added to net farm income equals difference in net farm income and returns to operators.
[2]Includes landlord capital consumption.
[3]Statistics in and above the net farm income line represent the farm sector, defined as including farm operators' dwellings located on farms. Statistics below the net farm income line represent only the farm businesses to the exclusion of the operators' dwellings.
[4]Returns to operators is equivalent to net farm income excluding the income and expenses associated with farm operator's dwellings.
[5]Excludes landlord capital consumption.
Source: Economic Research Service, U.S. Department of Agriculture.

Table 1-3—Leading commodities for cash receipts, 1996

Rank[1]	Items	Value of U.S. receipts	Percent of U.S. total	Cumulative percent[2]	Rank in prior year
		Thousand dollars[3]	---------- *Percent* ----------		
	All commodities	202,338,990	100.0	—	—
	Livestock and products	92,914,212	45.9	—	—
	Crops	109,424,778	54.1	—	—
1	Cattle and calves	31,138,046	15.4	15.4	1
2	Dairy products	22,833,925	11.3	26.7	2
3	Corn	21,573,363	10.7	37.3	3
4	Soybean	16,211,387	8.0	45.3	4
5	Broilers	13,906,019	6.9	52.2	5
6	Hogs	12,643,736	6.2	58.5	7
7	Greenhouse and nursery	10,887,058	5.4	63.9	6
8	Wheat	9,955,616	4.9	68.8	8
9	Cotton	7,460,813	3.7	72.5	9
10	Chicken eggs	4,756,571	2.4	74.8	10
11	Hay	3,573,530	1.8	76.6	11
12	Turkeys	3,056,314	1.5	78.1	12
13	Tobacco	2,795,990	1.4	79.5	13
14	Potatoes	2,699,259	1.3	80.8	14
15	Grapes	2,334,020	1.2	82.0	15
16	Apples	1,846,052	0.9	82.9	19
17	Sorghum grain	1,813,188	0.9	83.8	20
18	Oranges	1,798,311	0.9	84.7	17
19	Tomatoes	1,603,232	0.8	85.4	18
20	Rice	1,575,115	0.8	86.2	21
21	Lettuce	1,427,400	0.7	86.9	16
22	Sugar beets	1,017,475	0.5	87.4	22
23	Almonds	1,008,576	0.5	87.9	25
24	Barley	992,388	0.5	88.4	26
25	Peanuts	969,132	0.5	88.9	23
26	Cane for sugar	865,965	0.4	89.3	26
27	Strawberries	770,324	0.4	89.7	27
28	Aquaculture	767,750	0.4	90.1	29
29	Mushrooms	753,052	0.4	90.5	28
30	Onions	701,006	0.3	90.8	30
31	Dry beans	663,875	0.3	91.1	32
32	Corn, sweet	636,023	0.3	91.4	31
33	Horses/mules	628,000	0.3	91.8	33
34	Sheep and lambs	600,716	0.3	92.1	34
35	Christmas trees	474,435	0.2	92.3	NA
	Government payments[4]	7,285,541	—	—	—

— = Not applicable.
NA = Not available.
[1]Rankings for States and commodities available on Internet at www.econ.ag.gov/briefing/fbe/fi/fi.htm
[2]The cumulative percentage is the sum of the percentage of U.S. total for each commodity and all preceding commodities.
[3]Numbers may not add due to rounding.
[4]Government payments made directly to farmers in cash or payment-in-kind.
Source: Economic Research Service, U.S. Department of Agriculture.

Table 1-4—Farm sector gross capital expenditures, 1985-96[1]

Year	Buildings and land[2]				Motor vehicles[3]				Machinery and equipment[7]	Total capital expenditures	
	Operator farm dwellings[4]	Service structures and land improvements			Total	Tractors	Trucks	Auto-mobiles	Total		Including operator dwellings	Excluding operator dwellings
		Total	Service structures[5]	Land improvements[6]								
	Million dollars											
1985	938	2,256	1,314	942	3,193	1,937	1,537	225	3,699	3,232	10,124	9,186
1986	712	2,139	1,459	680	2,852	1,513	1,462	252	3,227	3,094	9,173	8,460
1987	931	2,605	1,734	870	3,536	2,104	1,855	316	4,275	4,297	12,108	11,177
1988	1,262	2,388	1,357	1,031	3,650	2,540	2,076	296	4,912	4,222	12,783	11,521
1989	1,235	2,519	1,575	944	3,754	2,903	2,350	230	5,484	5,087	14,326	13,090
1990	2,029	2,784	1,662	1,122	4,813	3,119	2,373	259	5,750	5,589	16,152	14,123
1991	1,216	2,723	1,648	1,075	3,939	2,593	2,111	289	4,993	5,410	14,343	13,126
1992	1,417	2,391	1,388	1,003	3,808	2,826	1,945	355	5,126	5,132	14,066	12,650
1993	1,508	3,191	1,661	1,531	4,699	2,689	2,221	279	5,189	5,488	15,376	13,868
1994	1,645	3,246	1,852	1,394	4,891	2,893	2,301	259	5,453	5,182	15,526	13,881
1995	1,312	3,014	1,717	1,298	4,326	2,911	2,600	200	5,711	5,051	15,088	13,776
1996	1,689	3,804	2,293	1,511	5,493	2,974	2,848	221	6,043	5,495	17,031	15,342

[1]Capital expenditures are based on the Farm Costs and Returns Survey (FCRS) for 1982 and later years. Since 1991, FCRS estimates have incorporated nonresponse and undercoverage adjustments that ensure representation of the entire farm sector. Estimates for 1988-90 are based on interpolations of prior estimates between the final 1987 and 1991 estimates. FCRS data for 1997 were adjusted to represent the USDA number of farms in sales classes under $100,000. FCRS data used in estimates prior to 1987 Farm Production Expenditures summaries.
[2]Includes new construction, additions, and major improvements.
[3]Share of capital items used in the farm business only.
[4]Operator dwellings located on farm real estate only.
[5]Includes service buildings, other structures, and dwellings not occupied by farm operators.
[6]Includes fences, windmills, wells, irrigation equipment, dams and ponds, terraces, drainage ditches, tile lines, other soil conservation facilities.
[7]Excludes irrigation equipment, which is included in land improvements, and minor types of equipment charged to miscellaneous expenses.
Source: Economic Research Service, U.S. Department of Agriculture.

Table 1-5—Farm sector capital replacement costs, 1985-96[1]

Year	Buildings			Motor vehicles[2]				Other machinery and equipment[5]	Total capital replacement	
	Operator farm dwellings[3]	Service structures[4]	Total	Tractors	Trucks	Auto-mobiles	Total		Including operator dwellings	Excluding operator dwellings
	Million dollars									
1985	1,299	3,095	4,394	2,982	2,402	795	6,179	8,191	18,765	17,465
1986	1,277	2,954	4,231	2,830	2,121	657	5,609	7,425	17,265	15,988
1987	1,484	2,953	4,436	2,477	2,106	573	5,157	7,102	16,695	15,211
1988	1,664	2,861	4,525	2,722	2,153	530	5,405	7,077	17,007	15,343
1989	1,703	2,823	4,525	3,180	2,171	467	5,817	7,046	17,389	15,686
1990	1,606	2,747	4,353	3,553	2,160	396	6,109	7,055	17,517	15,911
1991	1,601	2,689	4,290	3,629	2,161	351	6,142	7,139	17,571	15,970
1992	1,658	2,621	4,279	3,521	2,163	349	6,033	7,084	17,396	15,738
1993	1,814	2,583	4,397	3,535	2,234	350	6,119	7,107	17,623	15,809
1994	2,096	2,551	4,646	3,577	2,343	339	6,259	7,159	18,064	15,968
1995	2,304	2,552	4,856	3,689	2,230	290	6,209	7,148	18,213	15,909
1996	2,428	2,499	4,927	3,762	2,282	267	6,311	6,946	18,184	15,756

[1]Estimates are based on current replacement cost, not acquisition cost.
[2]Share of item used in the farm business only.
[3]Operator dwellings located on farms only. New methods and data are used to compute operator dwelling capital replacement beginning with 1984. The revised replacement rate is lower than the previous rate. Estimates before 1984 are not compatible with later estimates.
[4]Includes service buildings, other structures, and dwellings not occupied by farm operators. Capital replacement is not calculated for land improvements.
[5]Excludes irrigation equipment, which is included in land improvements, and minor types of equipment charged to miscellaneous expenses.
Source: Economic Research Service, U.S. Department of Agriculture.